

Calvert Jane (2024) A Place for Science and Technology Studies: Observation, Intervention and Collaboration. Cambridge: MIT Press. 232 pages. ISBN 9780262546942

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For the past 15+ years, Jane Calvert has been a central figure in STS' investigations in the area of synthetic biology (SynBio). The work in the area has been both extensive and wide-ranging, from policy and governance recommendations and reports on appropriate use, to considerations at the intersection of synthetic biology and art, and much more both adjacent and in between. In the face of this substantial scholarship, *ceci n'est pas un livre sur le sujet de la biologie synthétique*. I mean, it is and it isn't. What Calvert presents is a reflection – not a report – on years of STS scholarship in this area, and – more central to the book – the diverse orientations that work has taken. In the process of doing so Calvert does not re-present the findings from previously published work, but instead describes and critically reflects on their role as an STS scholar in diverse settings, “on the nature of the field, its origins, and its objectives” (p. 10). The result is a critical and self-reflexive examination of the author's research program that has covered a range of activities, as well as an exploration of orientations the interdisciplinary field of STS can, and does, undertake.

To help in this reflection Calvert develops a metaphor of 'rooms' to describe the different contexts that an STS scholar finds themselves in. The rooms are not specific physical spaces, but rather representations of diverse research and practice settings where Calvert has conducted a range of activities with varied colleagues and collaborators through the years. A chapter is dedicated to each of these rooms: the laboratory,

the conference room, the classroom, the coffee room, the art studio, the bioethics building, the policy room, and the ivory tower. The description of the rooms is not limited to the kinds of insights of the socio-technical work whereby SynBio gets done in diverse settings but also includes Calvert's own experience in conducting STS research on-and-with the diverse SynBio communities. In doing so, Calvert traces how STS more broadly has conducted its academic business in such settings. Eschewing 'academic' and 'activist' forms of STS, Calvert instead focuses on the three different orientations of observation, intervention, and collaboration, and then moves “from room to room in the following chapters” enabling her “to explore the various situations that allow for each of these orientations, the opportunities they provide, and the challenges they present” (p. 12). Near the end of each chapter, Calvert inquires into the extent to which that particular room is 'a place for STS', and explores how STS is constrained or enabled there depending on the kind of orientation that the room facilitates.

For instance, in an early chapter on the laboratory, Calvert sketches out lab studies within STS and traces how its primarily observational practices have evolved. The author goes on to describe their work within a synthetic yeast project and one of its associate labs where they were located. With a description of the author's activities within the lab in place, a lament follows of the observational role that can be left to STS scholars in this context. Calvert notes that if a project has



been set in motion with little STS input, or there is no congruence between the expectations of the scientists and the STS researcher of the work to be done, then there is really no chance for meaningful intervention or collaboration within the project. Calvert then notes that this kind of observational orientation for STS within the lab is rather limited, and points towards the benefits of different kinds of ethnographic practices in contemporary STS research.

Calvert follows this approach as they travel from room to room in subsequent chapters that make up the core of the book. The conference room is seen to be designed to be observational with opportunities for pointed intervention, whereas the ivory tower (i.e., academia and the library specifically) is seen as a place for a type of retrospective observation through writing and reading. The policy room can be seen as a place to observe the policy process, but also as a place to build policy set to steer or intervene in SynBio activities (p. 175). Calvert highly values the art studio and the coffee room as collaborative spaces “that are not motivated by instrumental aims or tied to predefined deliverables but instead involve thinking with others” in an experimental mode that can “expand the imaginations of those involved and give rise to outcomes that are novel and unexpected” (p. 175). This form of collaborative STS is advanced in the concluding chapter where Calvert advocates for opportunities where researchers are integrated into the production of science and technology, but in a way that preserves our ability and space to make critical contributions to that knowledge- and material-making.

Throughout the book, techno-scientific utopian or dystopian positionality is rejected, and instead, forms of ‘otherwising’ (i.e., the idea that things could be otherwise) are advocated for in problematizing particular futures, assumptions of innovations, or techno-scientific trends. Calvert’s experiences demonstrate the value of individual researchers spending time in different spaces/rooms, and in doing so exploring the three orientations of observation, intervention and collaboration in STS. In part this is beneficial, according to Calvert, “to calibrate our policy work” (p. 158), but more so because it can be of epistemic assistance to “recognize value and limitations of each [orien-

tation], the necessity of shifting between them in some circumstances, and the tensions that can result from doing so” (p. 174).

In many ways, there are not a lot of books like this. In fact, I cannot think of one that engages with the orientations of the discipline (that is not in the manner of a textbook) but also tells a first-person research-driven account of the different things STS can be. Perhaps one of the reasons for this rarity is the difficulty of striking a balance between meta-analysis of STS as a discipline, and auto-biographical reflection of a researcher’s position within it. In this instance thick descriptions of the author’s activities within the rooms do make up the bulk of the book (save the introductory and concluding chapters), but make no mistake, Calvert’s work in SynBio is a vehicle to explore broader issues within STS and the role of researchers there. The connections that Calvert is reflecting on between academic and activist positioning of STS to science and technology is one that is widespread in the field. The reorientation towards observation, intervention, and collaboration is both apt and likely to address this tension that has been present in STS since the normative, and then interventionist turns. In this way, the book stands to be of particular interest to those starting off on STS journeys, as well as those reflecting on and situating their own practices (be them in academia or elsewhere). Many – including Calvert – see STS as a field of scholarship that has a kind of disciplinary insecurity compared to more traditional approaches that are institutionalized with dedicated departments and funding programs that bear their names. STS researchers are “itinerant”, says Calvert, lacking “a room of their own; instead, they move from room to room. In this way, they become a liminal figure” (p. 173). Because of this liminality, STS needs books like this. We need to reflect on not just what we want STS to be but also broaden our horizons of what it can be. We need to explore what kinds of rooms we can do our work in, and the strengths and limitations our approaches and contributions are likely to face in those spaces. This book helps us to think about the orientations through which we practice STS, what those practices need in terms of resources and support, where we embody these different orientations, and to what end or purpose.